



# UNITED STATES PATENT AND TRADEMARK OFFICE

UNITED STATES DEPARTMENT OF COMMERCE  
United States Patent and Trademark Office  
Address: COMMISSIONER FOR PATENTS  
P.O. Box 1450  
Alexandria, Virginia 22313-1450  
www.uspto.gov

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/584,229	06/29/2007	Jan Anders Linnenkohl	QU01H10/P-WO3/US (589-15)	9841
38790 7590 04/28/2011 THE SMALL PATENT LAW GROUP LLP 225 S. MERAMEC, STE. 725T ST. LOUIS, MO 63105			EXAMINER BOWMAN, ANDREW J	
			ART UNIT	PAPER NUMBER
			1717	
			NOTIFICATION DATE	DELIVERY MODE
			04/28/2011	ELECTRONIC

**Please find below and/or attached an Office communication concerning this application or proceeding.**

The time period for reply, if any, is set in the attached communication.

Notice of the Office communication was sent electronically on above-indicated "Notification Date" to the following e-mail address(es):

Docket@splglaw.com

<b>Office Action Summary</b>	<b>Application No.</b> 10/584,229	<b>Applicant(s)</b> LINNENKOHL ET AL.	
	<b>Examiner</b> ANDREW BOWMAN	<b>Art Unit</b> 1717	

**-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --**

### Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

### Status

- 1) ☒ Responsive to communication(s) filed on 07 February 2011.
- 2a) ☒ This action is **FINAL**.                      2b) ☐ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

### Disposition of Claims

- 4) ☒ Claim(s) 26-52 is/are pending in the application.
- 4a) Of the above claim(s) \_\_\_\_\_ is/are withdrawn from consideration.
- 5) ☐ Claim(s) \_\_\_\_\_ is/are allowed.
- 6) ☒ Claim(s) 26-35, 37, 39 and 41-48 is/are rejected.
- 7) ☒ Claim(s) 36, 38, 40 and 49-52 is/are objected to.
- 8) ☐ Claim(s) \_\_\_\_\_ are subject to restriction and/or election requirement.

### Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on \_\_\_\_\_ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.  
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).  
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

### Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All    b) ☐ Some \*    c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
  2. ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.
  3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

\* See the attached detailed Office action for a list of the certified copies not received.

### Attachment(s)

- |                                                                                     |                                                                   |
|-------------------------------------------------------------------------------------|-------------------------------------------------------------------|
| 1) <input type="checkbox"/> Notice of References Cited (PTO-892)                    | 4) <input type="checkbox"/> Interview Summary (PTO-413)           |
| 2) <input type="checkbox"/> Notice of Draftperson's Patent Drawing Review (PTO-948) | Paper No(s)/Mail Date. _____                                      |
| 3) <input type="checkbox"/> Information Disclosure Statement(s) (PTO/SB/08)         | 5) <input type="checkbox"/> Notice of Informal Patent Application |
| Paper No(s)/Mail Date _____                                                         | 6) <input type="checkbox"/> Other: _____                          |

### **DETAILED ACTION**

Claims 26-52 remain pending in the current application

#### ***Claim Rejections - 35 USC § 103***

1. Claims 26-35, 37, 39, 41- 48 are rejected under 35 U.S.C. 103(a) as being unpatentable over Bieman et al. (US6451757)

Regarding claim 26, 28, 30, 32-34, 39, 45, and 46, Bieman teaches that it is known to deposit an adhesive line onto a substrate using an applicator (abstract), wherein the application of the structure is monitored by using light sensors, wherein the detectors are located on a track surrounding the applicator (Fig. 2), and wherein the surrounding track intersects the track in at least the same type of way as the prior art (although there is a problem with how it is described, referring to the 112 rejection above). Bieman fails to teach wherein the detectors detection area overlaps with the area of another. However it is the position of the examiner, that one of ordinary skill in the art would be motivated to overlap the detection area of each detector with that of another in order to 1) ensure that both edges of the adhesive line are fully detected (such as that the detected area is round and in order for a line having width to pass through the center of two adjacent circles, the circles must overlap at least some in order to detect the entire line width) and 2) just for general redundancy measures wherein if one camera fails another can aid in doing the job of the other for the purposes of continuing production until a time when it is best suited to repair the parts.

Regarding claims 27, it is the position of the examiner that the projection and detection of light meets the limitations of the current claims.

Regarding claim 29, it is the position of the examiner that although its completion is not shown, if the deposition that is occurring in Fig. 1 were continued to completion, its rectangular form would meet the limitations of the current claim.

Regarding claims 31, 35, 41, 42, 44, it appears as though the prior art uses a detector about every 10 degrees on a full circle (fig. 2).

Regarding claim 37, it is the position of the examiner that the light sensed by the sensors of the prior art feeds the detected light to the camera (column 4, line 57 through column 5, line 21) (where it is the position of the examiner that the purpose of the camera is to take in the data from the multiple sensors to form a cumulative "image") from which an image is produced. Although, the prior art fails to explicitly state that the data is used to literally form an image, it is suggested by the mere use of a camera that the data is at least used to form a data image. The examiner is taking Official Notice to inform the applicant that both visual inspections and computer operated inspections based on data acquired from cameras are both very well-known in the quality control art. Visual inspection of an image or inspection of a data image by a computer would both be considered obvious to perform be they are both well suited to the current method, although the examiner would tend to think that computerized inspection would be more accurate.

Regarding claim 43, it is the position of the examiner that the prior art most likely doesn't use the whole image from any one sensor, 1) the prior art meets the limitations of

Art Unit: 1717

the claim wherein the strip is the size of the entire image and 2) one would be motivated to only use the area of the image that relates to the edges of the adhesive line in order to prevent the use of excess data space, storing data that is of no use with relation to the intended operation of the machinery.

Regarding claim 47, it is the position of the examiner that as shown above, Bieman teaches detectors that are approximately 10 degrees apart (36 in a 360 degree circle). One would be motivated to have the cameras have an overlap of 10 degrees 1) so that one camera could do the job of another or two others in case of failure of one or both of the cameras adjacent to the camera of reference and 2) for the purpose of redundancy in order to ensure quality control, like in other known devices that have fail-safes and multiple ways of detecting the same thing or condition.

Regarding claim 48, it is the position of the examiner that the holes or areas in the circular structure in which the sensors are would meet the limitations of "form elements".

### ***Allowable Subject Matter***

2. Claims 36, 38, 40, and 49-52 are objected to as being dependent upon a rejected base claim, but would be allowable if rewritten in independent form including all of the limitations of the base claim and any intervening claims.

The following is a statement of reasons for the indication of allowable subject matter:

It is the position of the examiner that in general, the specific number and angle designation of the cameras used, the way in which the cameras progress from one to

Art Unit: 1717

another, and the specific way in which the camera view intersects a line on the frame are not known in the art of adhesive administration.

The most pertinent prior art (US6541757) is of the same general type of adhesive administration device as that of the current claims, but it fails to teach many of the structural relationships of the current claims that make them significant.

### ***Response to Arguments***

With regards to the teachings of Bieman, the applicant states that Bieman merely teaches using sensors that are not capable of imaging. However, Bieman clearly states “the method also includes the step of converting the light intensity values into electronic signals through the use of a camera” (column 6, lines 10-14). It appears as though the sensors are directly part of a camera system that produces “gray-scale” values. It is the position of the examiner that it is understood that these gray scale values can be used to produce a gray-scale image. Additionally the applicant makes statements as to why one would not overlap the detectors as stated by the examiner because it could cause other areas to be missed. However, the examiner did not make statements related to moving detectors away from the area to be detected. This would be counterproductive and the movement of cameras to avoid missing areas of coverage would be well within the skill of one of ordinary skill in the art.

***Conclusion***

3. **THIS ACTION IS MADE FINAL.** Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

A shortened statutory period for reply to this final action is set to expire THREE MONTHS from the mailing date of this action. In the event a first reply is filed within TWO MONTHS of the mailing date of this final action and the advisory action is not mailed until after the end of the THREE-MONTH shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than SIX MONTHS from the mailing date of this final action.

Any inquiry concerning this communication or earlier communications from the examiner should be directed to ANDREW BOWMAN whose telephone number is (571)270-5342. The examiner can normally be reached on Monday through Friday (7:30 to 5:00)EST.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Dah-Wei Yuan can be reached on 571-272-1295. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Art Unit: 1717

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

Andrew J Bowman  
Examiner  
Art Unit 1717

/Dah-Wei D. Yuan/  
Supervisory Patent Examiner, Art Unit 1717